

Maximum Length of a Concatenated String with Unique Characters

[\(View\)](#)

You are given an array of strings `arr`. A string `s` is formed by the **concatenation** of a **subsequence** of `arr` that has **unique characters**.

Return the **maximum** possible length of `s`.

A **subsequence** is an array that can be derived from another array by deleting some or no elements without changing the order of the remaining elements.

Example 1:

Input: `arr = ["un","iq","ue"]`

Output: 4

Explanation: All the valid concatenations are:

- ""
- "un"
- "iq"
- "ue"
- "uniq" ("un" + "iq")
- "ique" ("iq" + "ue")

Maximum length is 4.

Example 2:

Input: `arr = ["cha","r","act","ers"]`

Output: 6

Explanation: Possible longest valid concatenations are "chaers" ("cha" + "ers") and "acters" ("act" + "ers").

Example 3:

Input: `arr = ["abcdefghijklmnopqrstuvwxyz"]`

Output: 26

Explanation: The only string in `arr` has all 26 characters.

Constraints:

- `1 <= arr.length <= 16`
- `1 <= arr[i].length <= 26`
- `arr[i]` contains only lowercase English letters.